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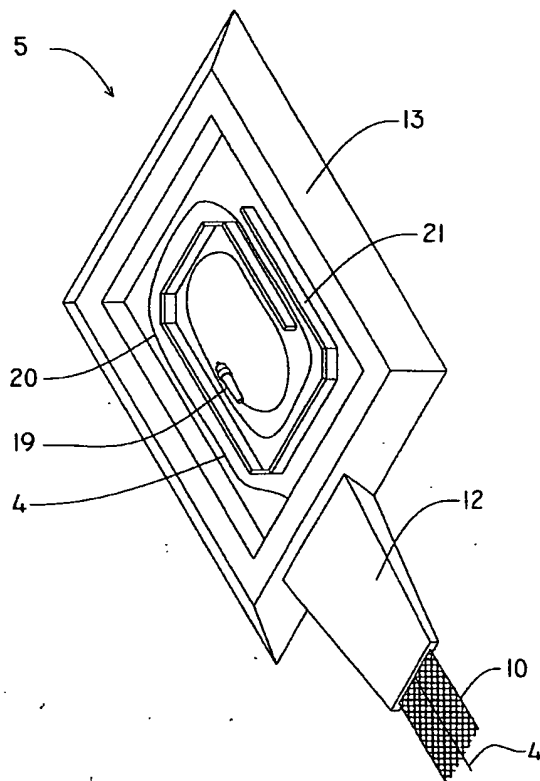


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**(54) Title: DEVICE INCLUDING A SYSTEM ADAPTED FOR USE IN TEMPERATURE COMPENSATION OF STRAIN MEASUREMENTS IN FIBRE-REINFORCED STRUCTURES**



**(57) Abstract:** The present invention relates to a device comprising a fibre-reinforced part and including at least one system comprising at least one optical fibre as well as connecting means adapted for connection of light emitting means and light receiving means to the optical fibre, said optical fibre comprising a number of reflecting structures. One object of the invention is to provide means suitable for use in providing compensation for temperature change in strain measurement, which may be built into fibre-reinforced parts of a device. This is obtained by having holding means adapted to hold one or more loops formed on the optical fibre, in a way where at least one loop may substantially freely change length when subject to a change in temperature.

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